

Docket No.: 60637RCE (50370)
(PATENT)

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Patent Application of:
Christine A. Klein, et al.

Application No.: 09/747,774

Confirmation No.: 5116

Filed: December 21, 2000

Art Unit: 1646

For: METHODS AND COMPOSITIONS FOR
IDENTIFYING RECEPTOR EFFECTORS

Examiner: R. Li

MS RCE

Commissioner for Patents
P.O. Box 1450
Alexandria, VA 22313-1450

"Express Mail" mailing label number EV 437819275 US Date of Deposit October 19, 2004

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Peter C. Lauro, Esq.

Please Print Name of Person Signing


Signature

SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT (IDS)

Dear Sir:

In accordance with 37 CFR 1.97, Applicant(s) hereby make of record the references listed on the enclosed Form PTO/SB/08a/b. Applicants are in the process of obtaining copies of the references and will forward same to the Examiner as soon as possible.

This statement is not to be interpreted as a representation that the cited documents are material, that an exhaustive search has been conducted, or that no other relevant information exists. Nor shall the citation of any document herein be

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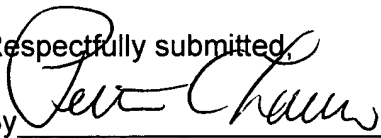
Docket No.: 60637RCE(50370)

construed *per se* as a representation that such document is prior art. Moreover, Applicant(s) understand(s) the Examiner will make an independent evaluation of the cited documents.

The Director is hereby authorized to charge any deficiency in the fees filed, asserted to be filed or which should have been filed herewith (or with any paper hereafter filed in this application by this firm) to our Deposit Account No. 04-1105, under Order No. 60637C5DV(50370). A duplicate copy of this paper is enclosed.

Dated: October 19, 2004

Respectfully submitted,

By 

Peter C. Lauro

Registration No.: 32,360

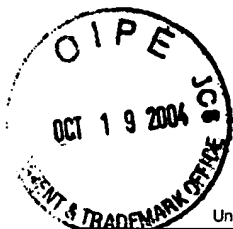
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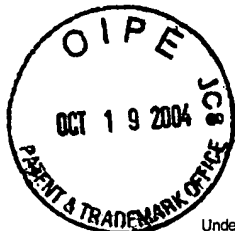


Substitute for form 1449A/B/PTO INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Use as many sheets as necessary)				Complete if Known	
				Application Number	09/747,774
Sheet 1 of 7				Filing Date	December 21, 2000
				First Named Inventor	Christine A. Klein et al.
				Art Unit	1646
				Examiner Name	R. Li
				Attorney Docket Number	60637C5DV(50370)
U.S. PATENT DOCUMENTS					
Examiner Initials*	Cite No. ¹	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number-Kind Code ² (if known)			
	AA	09/258,600		Fowlkes et al. (filed 02-1999)	
	AB	09/286,166 *		Fowlkes et al. (filed 04-1999)	
	AC	09/581,861		Broach et al. (filed 03-2001)	
	AD	09/747,774		Klein et al. (filed 12-2000)	
	AE	10/263,341		Fowlkes et al. (filed 10-2002)	
	AF	10/277,607		Klein et al. (filed 10-2002)	
	AG	10/752,478		Klein et al. (filed 01-2004)	
	AH	US-4,418,149	11-1983	Ptashne et al.	
	AI	US-4,833,080	05-1989	Brent et al.	
	AJ	US-5,284,746	02-1994	Sledziewski et al.	
	AK	US-5,573,944	11-1996	Kirschner et al.	
	AL	US-5,739,029	04-1998	King et al.	
	AM	US-5,789,184	08-1998	Fowlkes et al.	
	AN	US-6,100,042	08-2000	Fowlkes et al.	
	AO	US-5,876,951	03-1999	Fowlkes et al.	
	AP	US-6,255,059	07-2001	Fowlkes et al.	
	AQ	US-6,168,927	01-2001	King et al.	
	AR	US-			
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	AF1	US-			
	AG1	US-			
	AH1	US-			
	AI1	US-			
	AJ1	US-			
	AK1	US-			
	AL1	US-			

* Application has been transferred to another firm and is no longer available.

¹EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. ² Applicant's unique citation designation number (optional). ³ See Kinds Codes of USPTO Patent Documents at www.uspto.gov or MPEP 901.04. ⁴ Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). ⁵ For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁶ Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST.16 if possible. ⁷ Applicant is to place a check mark here if English language Translation is attached.

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Sheet	2	of	7	Attorney Docket Number	60637C5DV(50370)

NON PATENT LITERATURE DOCUMENTS

Examiner Initials	Cite No. ¹	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T ²
	CA	Akada, R. et al. "Genetic Relationships Between the G Protein $\beta\gamma$ Complex, Ste5p, Ste20p and Cdc42p: Investigation of Effector Roles in the Yeast Pheromone Response Pathway," <i>Genetics</i> 143:103-117 (1996)	
	CB	Artemyev, Nikolai O. et al. "Sites of Interaction between Rod G-Protein α -Subunit and cGMP-phosphodiesterase γ -Subunit," <i>J. Biol. Chem.</i> 267(35):25067-72 (1992)	
	CC	Awramik, S. M. "New fossil finds in old rocks," <i>Nature</i> 319:446-47 (1986)	
	CD	Bender, Alan and Sprague, George F. Jr. "Pheromones and Pheromone Receptors Are the Primary Determinants of Mating Specificity in the Yeast <i>Saccharomyces cerevisiae</i> ," <i>Genetics</i> 121:463-76 (1989)	
	CE	Blinder, Dmitry et al. "Constitutive Mutants in the Yeast Pheromone Response: Ordered function of the Gene Products," <i>Cell</i> 56:479-486 (1989)	
	CF	Brill, Julie A. et al. "A Role for Autophosphorylation Revealed by Activated Alleles of <i>FUS3</i> , the Yeast MAP Kinase Homolog," <i>Molecular Biology of the Cell</i> 5:297-312 (1994)	
	CG	Burack, W. Richard et al. "The Activating Dual Phosphorylation of MAPK by MEK Is Nonprocessive," <i>Biochemistry</i> 36(20):5929-5933 (1997)	
	CH	Cavallini, Bruno et al. "A yeast activity can substitute for the HeLa Cell TATA box factor," <i>Nature</i> 334:77-80 (1988)	
	CI	Chan, Russell K. and Otte, Carol A. "Isolation and Genetic Analysis of <i>Saccharomyces cerevisiae</i> Mutants Supersensitive to G1 Arrest by a Factor and α Factor," <i>Molecular and Cellular Biol.</i> 2(1):11-20 (1982)	
	CJ	Chang, Fred and Herskowitz, Ira "Identification of a Gene Necessary for Cell Cycle Arrest by a Negative Growth Factor of Yeast: FAR1 is an Inhibitor of a G1 Cyclin, CLN2," <i>Cell</i> 63:999-1011 (1990)	
	CK	Clark, Karen L. et al. "Interactions among the Subunits of the G-protein Involved in <i>Saccharomyces cerevisiae</i> Mating," <i>Molecular and Cellular Biol.</i> 13(1):1-8 (1993)	
	CL	Cole, Gary M. et al. "Stoichiometry of G Protein Subunits Affects the <i>Saccharomyces cerevisiae</i> Mating Pheromone Signal Transduction Pathway," <i>Molecular and Cellular Biology</i> 10(2):510-517 (1990)	
	CM	Coleman, David E. et al. "Structures of Active Conformation of $G_{i\alpha 1}$ and the Mechanism of GTP Hydrolysis," <i>Science</i> 265:1405-12 (1994)	
	CN	Conklin, Bruce R. et al. "Substitution of three amino acids switches receptor specificity of $G_{\alpha q}$ to that of $G_{i\alpha}$," <i>Nature</i> 363:274-76 (1993)	
	CO	Dmochowska, Aleksandra et al. "Yeast <i>KEX1</i> Gene Encodes a Putative Protease with a Carboxypeptidase B-like Function Involved in Killer Toxin and α -Factor Precursor Processing," <i>Cell</i> 50:573-84 (1987)	
	CP	Dolan, J. W. et al. "Overproduction of the yeast STE12 protein leads to constitutive transcriptional induction," <i>Genes & Development</i> 4(4):492-502 (1990)	
	CQ	Etienne, Gilles et al. "A Screening Method for Antifungal Substances Using <i>Saccharomyces cerevisiae</i> Strains Resistant to Polyene Macrolides," <i>J. of Antibiotics</i> 43(2):199-206 (1990)	

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				Art Unit	1646
				Examiner Name	R. Li
Sheet	3	of	7	Attorney Docket Number	60637C5DV(50370)
CR	Fasullo, Michael T. and Davis, Ronald W. "Direction of Chromosome Rearrangements in <i>Saccharomyces cerevisiae</i> by Use of <i>his3</i> Recombination Substrates," <i>Molecular and Cellular Biol.</i> 8(10):4370-80 (1988)				
CS	Ferrell, James E. Jr. et al. "The Biochemical Basis of an All-or-None Cell Fate Switch in <i>Xenopus</i> Oocytes," <i>Science</i> 280:895-898 (1998)				
CT	Ferrell, James E. Jr. "Tripping the switch fantastic: how a protein kinase cascade can convert graded inputs into switch-like outputs," <i>Trends In Biochem. Sci.</i> 21(12):460-6 (1996)				
CU	Franke, Arthur E. et al. "Human C5a Anaphylatoxin: Gene Synthesis, Expression, and Recovery of Biologically Active Material from <i>Escherichia coli</i> ," <i>Methods in Enzymology</i> 162:653-68 (1988)				
CV	Gallego, Carme et al. "Myristoylation of the G _{α12} polypeptide, a G protein α subunit, is required for its signaling and transformation functions," <i>Proc. Natl. Acad. Sci. USA</i> 89:9695-99 (1992)				
CW	Garritsen, Anja et al. "The N-Terminal coiled-coil domain of β is essential for γ association: A Model for G-Protein βγ subunit interaction," <i>Proc. Natl. Acad. Sci. USA</i> 90:7706-10 (1993)				
CX	Gerard, Norma P. and Gerard, Craig "Construction and Expression of a Novel Recombinant Anaphylatoxin, C5a-N19, a Probe for the Human C5a Receptor," <i>Biochemistry</i> 29(39):9274-81 (1990)				
CY	Graf, Rolf et al. "A Truncated Recombinant α Subunit of G _{i3} with a Reduced Affinity for βγ Dimers and Altered Guanosine 5'-3'-O-(Thio)triphosphate Binding," <i>J. of Biol. Chem.</i> 267(34):24307-14 (1992)				
CZ	Gros, Philippe et al. "Mammalian Multidrug Resistance Gene: Complete cDNA Sequence Indicates Strong Homology to Bacterial Transport Proteins," <i>Cell</i> 47:371-80 (1986)				
CA1	Hagen, David C. et al. "Evidence the yeast <i>STE3</i> gene encodes a receptor for the peptide pheromone a factor: Gene sequence and implications for the structure of the presumed receptor," <i>Proc. Natl. Acad. Sci. USA</i> 83:1418-22 (1986)				
CB1	Harbury, Pehr B. et al. "A Switch Between Two-, Three- and Four-Stranded Coiled Coils in GCN4 Leucine Zipper Mutants," <i>Science</i> 262:1401-07 (1993)				
CC1	Hartwell, Leland H. "Mutants of <i>Saccharomyces cerevisiae</i> Unresponsive to Cell Division Control by Polypeptide Mating Hormone," <i>J. Cell Biol.</i> 85:811-22 (1980)				
CD1	Hasson, M.S. et al. "Mutational Activation of the <i>STE5</i> Gene Product Bypasses the Requirement for G Protein β and γ Subunits in the Yeast Pheromone Response Pathway," <i>Molecular and Cellular Biology</i> 14(2):1054-1065 (1994)				
CE1	He, Bin et al. "RAM2, an essential gene of yeast, and RAM1 encode the two polypeptide components of the farnesyltransferase that prenylates a-actor and Ras proteins," <i>Proc. Natl. Acad. Sci. USA</i> 88:11373-77 (1991)				
CF1	Hiltunen, J. Kalervo et al. "Peroxisomal Multifunctional β-Oxidation Protein of <i>Saccharomyces cerevisiae</i> ," <i>J. of Biol. Chem.</i> 267(10):6646-6653 (1992)				
CG1	Hrycyna, Christine A. et al. "The <i>Saccharomyces cerevisiae</i> <i>STE14</i> gene encodes a methyltransferase that mediates C-terminal methylation of a-factor and RAS Proteins," <i>The EMBO J.</i> 10(1):1699-1709 (1991)				

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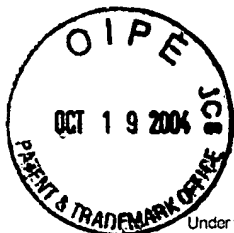


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Sheet	4	of	7	Attorney Docket Number	60637C5DV(50370)
	CH1	Huang, Chi-Ying F. et al. "Ultrasensitivity in the mitogen-activated protein kinase cascade," <i>Proc. Natl. Acad. Sci. USA</i> 93:10078-10083 (1996)			
	CI1	Medici, R. et al. "Efficient signal transduction by a chimeric yeast-mammalian G protein α subunit Gpa1-Gs α covalently fused to the yeast receptor Ste2," <i>EMBO</i> 16:7241-7249 (1997)			
	CJ1	Inouye, Carla et al. "Ste5 RING-H2 Domain: Role in Ste4-Promoted Oligomerization for Yeast Pheromone Signaling," <i>Science</i> 278:103-106 (1997)			
	CK1	Jabbar, M. Abdul et al. "Influenza Viral (A/WSN/33) hemagglutinin is expressed and glycosylated in the yeast <i>Saccharomyces cerevisiae</i> ," <i>Proc. Natl. Acad. Sci. USA</i> 82:2019-23 (1985)			
	CL1	Journot, Laurent et al. "Amino Acids 367-376 of the G $_s$ α subunit induce membrane association when fused to soluble amino-terminal deleted G $_{i1}$ α subunit," <i>Proc. Natl. Acad. Sci. USA</i> 88:10054-58 (1991)			
	CM1	Julius, David et al. "Glycosylation and Processing of Prepro- α -Factor through the Yeast Secretory Pathway," <i>Cell</i> 36:309-18 (1984)			
	CN1	Julius, David et al. "Isolation of the Putative Structural Gene for the Lysine-Arginine-Cleaving Endopeptidase Required for Processing of Yeast Prepro- α -factor," <i>Cell</i> 37:1075-89 (1984)			
	CO1	Julius, David et al. "Yeast α Factor is Processed from a Larger Precursor Polypeptide: The Essential Role of a Membrane-Bound Dipeptidyl Aminopeptidase," <i>Cell</i> 32:839-52 (1983)			
	CP1	Kaiser, Chris A. et al. "Many Random Sequences Functionally Replace the Secretion Signal Sequence of Yeast Invertase," <i>Science</i> 235:312-17 (1987)			
	CQ1	Kingsman, S.M. et al. "The production of mammalian protein in <i>Saccharomyces cerevisiae</i> ," <i>Tibtech</i> 5:53-57 (1987)			
	CR1	Kramer, R. A. et al. "HTLV-III gag Protein Is Processed in Yeast Cells by the Virus pol-Protease," <i>Science</i> 231:1580-85 (1986)			
	CS1	Kuchler, Karl and Thorner, Jeremy "Functional expression of human <i>mdr1</i> in the yeast <i>Saccharomyces cerevisiae</i> ," <i>Proc. Natl. Acad. Sci. USA</i> 89:2302-06 (1992)			
	CT1	Kuchler, Karl et al. " <i>Saccharomyces cerevisiae</i> STE6 gene product: a novel pathway for protein export in eukaryotic cells," <i>The EMBO J.</i> 8(13):3973-84 (1989)			
	CU1	Kurjan, Janet " α -Factor Structural Gene Mutations in <i>Saccharomyces cerevisiae</i> : Effects on α -Factor Production and Mating," <i>Molecular and Cellular Biol.</i> 5(4):787-96 (1985)			
	CV1	Kurjan, Janet and Herskowitz "Structure of a Yeast Pheromone Gene (<i>MFa</i>): A Putative α -Factor Precursor Contains Four Random Copies of Mature α -Factor," <i>Cell</i> 30:933-43 (1982)			
	CW1	Lambright, David G. et al. "Structural determinants for activation of the α -subunit of a heterotrimeric G protein," <i>Nature</i> 369:621-28 (1994)			
	CX1	Lolait, S. et al., "Extrapituitary expression of the rat V1b vasopressin receptor gene," <i>PNAS USA</i> 92:6783-6787 (1995).			
	CY1	Lee, Ethan et al. "The G22A Mutant of G $_{s\alpha}$ Highlights the Requirement for Dissociation of G Protein Subunits," <i>J. Biol. Chem.</i> 267(2):1212-18 (1992)			

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

¹Applicant's unique citation designation number (optional). ²Applicant is to place a check mark here if English language Translation is attached.

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Sheet	5	of	7	Attorney Docket Number	60637C5DV(50370)

CZ1	Lemire, Bernard D. et al. "The Mitochondrial Targeting Function of Randomly Generated Peptide Sequences Correlates with Predicted Helical Amphiphilicity," <i>J. Biol. Chem.</i> 264(34):20206-12 (1989)	
CA2	Linder, Maurine E. et al. "Lipid Modifications of G Protein Subunits: Myristoylation of G _{0a} Increases its Affinity for $\beta\gamma$," <i>J. Biol. Chem.</i> 266(7):4654-59 (1991)	
CB2	Lupas, Andrei N. et al. "Do G protein subunits associate via a three-stranded coiled coil?" <i>FEBS</i> 314(2):105-08 (1992)	
CC2	Mackay, Vivian and Manney, Thomas R. "Mutations Affecting Sexual Conjugation and Related Processes in <i>Saccharomyces cerevisiae</i> . II Genetic Analysis of Nonmating Mutants," <i>Genetics</i> 76:273-88 (1974)	
CD2	Markby, David W. et al. "Separate GTP Binding and GTPase Activating Domains of a G α Subunit," <i>Science</i> 262:1895-1901 (1993)	
CE2	Michaelis, Susan and Herskowitz, Ira "The α -Factor Pheromone of <i>Saccharomyces cerevisiae</i> is Essential for Mating," <i>Molecular and Cellular Biol.</i> 8(3):1309-18 (1988)	
CF2	Milano, C.A. et al. "Enhanced Myocardial Function in Transgenic Mice Overexpressing the β_2 -Adrenergic Receptor," <i>Science</i> 264:582-86 (1994)	
CG2	Mumby, Susanne M. et al. "G-Protein α -subunit expression, myristoylation, and membrane association in COS cells," <i>Proc. Natl. Acad. Sci. USA</i> 87:728-32 (1990)	
CH2	Nakafuku, Masato et al. "Occurrence in <i>Saccharomyces cerevisiae</i> of a gene homologous to the cDNA coding for the α -subunit of mammalian G proteins," <i>Proc. Natl. Acad. Sci. USA</i> 84:2140-44 (1987)	
CI2	Nakayama, N. et al. "Common signal transduction system shared by <i>STE2</i> and <i>STE3</i> in haploid cells of <i>Saccharomyces cerevisiae</i> : autocrine cell-cycle arrest results from forced expression of <i>STE2</i> ," <i>The EMBO J.</i> 6(1):249-54 (1987)	
CJ2	Neer, Eva J. et al. "The Amino Terminus of a G Protein α Subunits Is Required for Interaction with $\beta\gamma$," <i>J. Biol. Chem.</i> 263(18):8996-9000 (1988)	
CK2	Noel, Joseph P. et al. "The 2.2 Å crystal structure of transducin- α complexed with GTP- γ -S," <i>Nature</i> 366:654-63 (1993)	
CL2	Oeda, Kenji et al. "Expression of Rat Liver Cytochrome P-450MC cDNA in <i>Saccharomyces cerevisiae</i> ," <i>DNA</i> 4(3):203-10 (1985)	
CM2	Ogden, Jill E. et al. "Efficient Expression of the <i>Saccharomyces cerevisiae</i> PGK Gene Depends on an Upstream Activation Sequence but Does Not Require TATA Sequences," <i>Molecular and Cellular Biol.</i> 6(12):4335-43 (1986)	
CN2	Pronin, Alexey N. and Gautam, Narasimhan "Interaction between G-Protein β and γ subunit types is selective," <i>Proc. Natl. Acad. Sci. USA</i> 89:6220-24 (1992)	
CO2	Ramer, Sandra W. and Davis, Ronald W. "A dominant truncation allele identifies a gene, <i>STE20</i> , that encodes a putative protein kinase necessary for mating in <i>Saccharomyces cerevisiae</i> ," <i>Proc. Natl. Acad. Sci. USA</i> 90:452-456 (1993)	
CP2	Rarick, Helen M. et al. "A Site on Rod G Protein α Subunit That Mediates Effector Activation," <i>Science</i> 256:1031-33 (1992)	
CQ2	Schafer, William R. et al. "Enzymatic Coupling of Cholesterol Intermediates to a Mating Pheromone Precursor and to the Ras Protein," <i>Science</i> 249:1133-39 (1990)	

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Sheet	6	of	7	Attorney Docket Number	60637C5DV(50370)
	CR2	Schafer, William R. et al. "Genetic and Pharmacological Suppression of Oncogenic Mutations in RAS Genes of Yeast and Humans," <i>Science</i> 245:379-85 (1989)			
	CS2	Schärer, E. and Iggo, R. "Mammalian p53 can function as a transcription factor in yeast," <i>Nucleic Acids Research</i> 20(7):1539-45 (1992)			
	CT2	Sikorski, Robert S. and Hieter, Philip "A System of Shuttle Vectors and Yeast Host Strains Designed for Efficient Manipulation of DNA in <i>Saccharomyces cerevisiae</i> ," <i>Genetics</i> 122:19-27 (1989)			
	CU2	Singh, Arjun et al. " <i>Saccharomyces cerevisiae</i> contains two discrete genes coding for the α -factor pheromone," <i>Nucleic Acids Research</i> 11(12):4049-63 (1983)			
	CV2	Slepek, Vladen Z. et al. "Mutational Analysis of G Protein α Subunit G_{α} Expressed in <i>Escherichia coli</i> ," <i>J. Biol. Chem.</i> 268(2):1414-23 (1993)			
	CW2	Spiegel, Allen M. et al. "The G Protein connection: molecular basis of membrane association," <i>TIBS</i> 16:338-41 (1991)			
	CX2	Steube, Klaus et al. " α -Factor-leader-directed secretion of recombinant human-insulin-like growth factor I from <i>Saccharomyces cerevisiae</i> ," <i>Eur. J. Biochem.</i> 198:651-57 (1991)			
	CY2	Stevenson, Brian J. et al. "Constitutive mutants of the Protein Kinase STE11 Activate the Yeast Pheromone Response Pathway in the Absence of the G Protein," <i>Genes & Development</i> 6:1293-1304 (1992)			
	CZ2	Strubin, Michel and Struhl, Kevin "Yeast and Human TFIID with Altered DNA-Binding Specificity of TATA Elements," <i>Cell</i> 68:721-30 (1992)			
	CA3	Struhl, Kevin "Constitutive and Inducible <i>Saccharomyces cerevisiae</i> Promoters: Evidence for Two Distinct Molecular Mechanisms," <i>Molecular and Cellular Biol.</i> 6(11):3847-53 (1986)			
	CB3	Struhl, Kevin et al. "High-frequency transformation of yeast: Autonomous replication of hybrid DNA molecules," <i>Proc. Natl. Acad. Sci. USA</i> 76(3):1035-39 (1979)			
	CC3	Struhl, Kevin and Hill, David E. "Two Related Regulatory Sequences are Required for Maximal Induction of <i>Saccharomyces cerevisiae</i> <i>his3</i> Transcription," <i>Molecular and Cellular Biol.</i> 7(1):104-10 (1987)			
	CD3	Sullivan, Kathleen A. et al., "Identification of receptor contact site involved in receptor-G protein coupling," <i>Nature</i> 330:758-60 (1987)			
	CE3	Teem, John L. et al. "Identification of Revertants for the Cystic Fibrosis $\Delta F508$ Mutation Using STE6-CFTR Chimeras in Yeast," <i>Cell</i> 73:335-346 (1993)			
	CF3	Thomas, Thomas C. et al. "G-protein α_0 subunit: Mutation of conserved cysteines identifies a subunit contact surface and alters GDP affinity," <i>Proc. Natl. Acad. Sci. USA</i> 90:10295-99 (1993)			
	CG3	Tyson, John J. et al. "Chemical kinetic theory: understanding cell-cycle regulation," <i>Trends In Biochem. Sci.</i> 21:89-96 (1996)			
	CH3	Walker, John E. et al. "Distantly related sequences in the α - and β -subunits of ATP synthase, myosin, kinases and other ATP-requiring enzymes and a common nucleotide binding fold," <i>The EMBO J.</i> 1(8):945-51 (1982)			

Examiner Signature		Date Considered	
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Substitute for form 1449A/B/PTO INFORMATION DISCLOSURE STATEMENT BY APPLICANT (Use as many sheets as necessary)				Complete if Known	
				Application Number	09/747,774
				Filing Date	December 21, 2000
				First Named Inventor	Christine A. Klein et al.
				Art Unit	1646
				Examiner Name	R. Li
				Attorney Docket Number	60637C5DV(50370)
Sheet	7	of	7		

CI3	Waters, M. Gerard et al. "Prepro- α -factor Has a Cleavable Signal Sequence," <i>J. Biol. Chem.</i> 263(13):6209-14 (1988)
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CJ3	Whiteway, Malcolm S. et al. "Association of the Yeast Pheromone Response G Protein β Subunits with the MAP Kinase Scaffold Ste5p," <i>Science</i> 269:1572-1575 (1995)
CK3	Whiteway, Malcolm et al. "The <i>STE4</i> and <i>STE18</i> Genes of Yeast Encode Potential β and γ Subunits of the Mating Factor Receptor-Coupled G Protein," <i>Cell</i> 56:467-477 (1989)
CL3	Zhan, Xiao-Li et al. "Differential regulation of <i>FUS3</i> MAP kinase by tyrosine-specific phosphatases <i>PTP2/PTP3</i> and dual-specificity phosphatase <i>MSG5</i> in <i>Saccharomyces cerevisiae</i> ," <i>Genes & Development</i> 11:1690-1702 (1997)
CM3	Vu et al. "Molecular cloning of a functional thrombin receptor reveals a novel proteolytic mechanism of receptor activation" <i>Cell</i> 64:1057-1068 (1991);
CN3	Bray, P. et al., "Human cDNA clones for four species of G α s signal transduction protein," <i>PNAS USA</i> , 1986 Dec;83(23):8893-7
CO3	Bray, P. et al., "Human cDNA clones for an α subunit of G α signal-transduction protein," <i>PNAS USA</i> , 1987 Aug;84(15):5115-9
CP3	Mattera, R. et al., "Identification by molecular cloning of two forms of the α -subunit of the human liver stimulatory (G α s) regulatory component of adenylyl cyclase," <i>FEBS Lett.</i> , 1986 Sep 29;206(1):36-42
CQ3	Dietzel, Christine et al. "Pheromonal regulation and sequence of the <i>Saccharomyces cerevisiae</i> SST2 gene: a model for desensitization to pheromone." <i>Mol. Cell. Biol.</i> 7(12):4169-4177, Dec. 1987.
CR3	Thien-Khai, H.V. et al. "Molecular Cloning of a Functional Thrombin Receptor Reveals a Novel Proteolytic Mechanism of Receptor Activation" <i>Cell</i> 64:1057-1068
CS3	Mattera, R. et al. "Identification by molecular cloning of two forms of the α -subunit of the human liver stimulatory (G α s) regulatory component of adenylyl cyclase," <i>FEBS</i> 206(1):36-41 (1986).
CT3	Ngo, J.T. et al. "Computational Complexity, Protein Structure Prediction, and the Levinthal Paradox" in <i>The Protein Folding Problem and Tertiary Structure Prediction</i> Merz K.M. et al., eds. Birkhauser, Boston, pp. 433-506 (1994).
CU3	Pi, H. et al. (1997) "Transcriptional activation upon pheromone stimulation mediated by a small domain of <i>Saccharomyces cerevisiae</i> Ste12p." <i>Mol. Cell. Biol.</i> 17(11):6410-6418 (1987).
CV3	Reneke, Johanna E. et al. "The carboxy-terminal segment of the yeast α -factor receptor is a regulatory domain" <i>Cell</i> 55:221-34 (1988).
CW3	Boulay, F. et al. "Synthesis and Use of a Novel N-Formyl Peptide Derivative to Isolate a Human N-Formyl Peptide Receptor cDNA" <i>Biochem. Biophys. Res. Commun.</i> 168(3):1103-1109 (1990);
CX3	Boulay, F. et al. "Expression Cloning of a Receptor for C5a Anaphylatoxin on Differentiated HL-60 Cells" <i>Biochemistry</i> 30:2993-2999 (1991);
CY3	Murphy, P.M. et al. "Functional Expression of the Human Formyl Peptide Receptor in <i>Xenopus</i> Oocytes Requires a Complementary Human Factor" <i>J. Biol. Chem.</i> 266(19):12560-12567 (1991).
CZ3	
CA4	
CB4	
CC4	

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